DOCUMENT RESUME

ED 091 819 80 EA 006 173

TITLE Comprehensive Planning in Education: A Planning Handbook for Districts. Handbook Series on Comprehensive Planning for Local Education Districts, No. 1.

INSTITUTION New Jersey State Dept. of Education, Trenton. Div. of Research, Planning, and Evaluation.

SPONS AGENCY Bureau of Education for the Handicapped (DHEW/OE), Washington, D.C.; Bureau of Elementary and Secondary Education (DHEW/OE), Washington, D.C.

PUB DATE Apr 74

NOTE 34p.; A related document is EA 005 992

EDRS PRICE MF-$0.75 HC-$1.85 PLUS POSTAGE

DESCRIPTORS Administrator Guides; *Educational Assessment; *Educational Needs; *Educational Objectives; *Educational Planning; Evaluation Methods; *Master Plans; School Districts

IDENTIFIERS *Comprehensive Planning; Elementary Secondary Education Act Title V; ESEA Title V; Project Next Step

ABSTRACT

The results of a special survey conducted in New Jersey school districts indicated that 90 percent of the responding districts desired more information about comprehensive planning models and needs assessment techniques. In response to the expressed desire of respondents, this handbook presents an overview of the comprehensive planning process, attempts to answer some general questions about the process, reviews the components of the planning process in greater detail to define and clarify each phase and its relationship to the whole, and provides a glossary of common terms used in educational planning. (Author)

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COMPREHENSIVE PLANNING IN EDUCATION

A Planning Handbook for Districts

No. 1 in a Series of Handbooks on Comprehensive Planning for Local Education Districts

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April, 1974

This handbook is a product of Project Next Step, funded by a Title V grant from the U.S. Office of Education, Bureau of Elementary and Secondary Education and Bureau of Educationally Handicapped.

EA 006 173

Planning Handbooks for Local Districts

	No. 1	Comprehensive Planning in Education
*	No. 2	Goal Development in Education
	No. 3	Needs Assessment in Education
**	No. 4	Problem Analysis in Education
**	No. 5	Implementation in Education
**	No. 6	Evaluation in Education
*	No. 7	Planning Bibliography for Education

* In preparation
** Projected

The activity which is the subject of this request was supported in whole or in part by the U.S. Office of Education, Department of Health, Education, and Welfare. However, the opinions expressed herein do not necessarily reflect the position or policy of the U.S. Office of Education, and no official endoresement by the U.S. Office of Education should be inferred.

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Foreword

In the summer of 1973 the Office of Planning of he New Jersey Department of Education conducted a special survey of school districts in New Jersey. The results of this survey indicated that 90% of the districts replying desired more information about comprehensive planning models and needs assessment techniques.

This handbook represents the response of the Office of Planning, now called the Bureau of Planning, to the expressed desire of the school districts. The first section of the handbook presents an overview of the comprehensive planning process, and attempts to answer some general questions about the process. The second section reviews the components of the planning process in greater detail to define and clarify each phase and its relationship to the whole. The final section of the handbook contains a glossary of common terms used in educational planning.

The production of this handbook was funded through Title V-C (ESEA) and "Project Next Step: Mutuality of Planning," both projects of the U.S. Office of Education, administered in New Jersey by the Bureau of Planning. The Bureau of Planning, and the New Jersey School Boards Association, together with the two Educational Improvement Centers, South and Northwest, are participating in the Cooperative Planning Project, a program designed to help promote educational planning in local districts throughout New Jersey. This is the initial handbook in a series about various aspects of educational planning that the Cooperative Planning Project intends to publish. One such handbook, Needs Assessment in Education has already been published. This handbook may be obtained by writing:

Bureau of Planning, Department of Education
225 West State Street, Trenton, New Jersey 08025

COMPREHENSIVE
PLANNING

A. WHAT IS COMPREHENSIVE PLANNING?

Planning means many things to many people. Administrators plan activities within the constraints and objectives of the budget; they plan the activities and time allocations of their staff; and they plan day-to-day activities of meetings, appointments and routine functions. Teachers and supervisors plan their classroom activities for the year and for the semester, often increasing lesson plan detail for the week or even the day. The school board and the superintendent must plan for budgetary and facility considerations one or more years in the future.

All of these examples represent forms of educational planning in the district. To one degree or another, a large amount of planning activity is already taking place in our educational systems. What, then, do we mean by creating or improving the planning function and capability at the district level? Why should a district develop a strong planning capability? How is such a capability developed? Every district should ask these questions and give some thought to these, and other, proposed answers.

We shall define planning as, "The process of developing alternative means for achieving goals and objectives." The emphasis upon planning as a process cannot be stressed too strongly. Planning is an ongoing activity, a tool to assist decision-makers in determining educational policy. It is a means of looking at a problem or a situation and determining "Where do we go from here?"

The planning process is one by which we ask, and attempt to answer, the questions: Where are we? Where do we want to go? What are some realistic ways of getting there? Which is the best route? What are the risks and likely side effects? When the plan is underway, we still must ask: How far have we come? Are we still on our course? Do we still want to go to the same place? What changes are required?

B. WHY A COMPREHENSIVE PLANNING MODEL?

This process, stated in a more formal fashion, may be found in Table I, the "Generic Planning Model." Virtually all districts are engaged in some of the components of this model; few engage in all of them; and fewer still employ a systematic sequence and approach so that the results of each phase have an impact upon subsequent phases. In addition, for the planning to be meaningful, it is necessary to employ the best available means (within limitations of fiscal and human resources,) of approaching each phase in the planning cycle. For example, the most accurate and comprehensive statement of goals and objectives will be meaningless without an equally accurate problem analysis and thorough generation of alternative means for reaching those goals. By the same token, the most thorough, imaginative program development process may be wasted if it does not meet the real needs of the district.

There was a time, not too long ago, when it was possible for a few key individuals within a district to carry out something like a rational planning process single-handedly. Now, the information explosion has reached education. More and more relevant data are available for use. The level of educational technology is constantly changing; new, effective programs are being developed in all areas almost daily. Schools are being asked to solve broad, complex social problems. And they are serving an increasingly diverse clientele-student, parent and community. All of these factors require that educators employ a more rational, systematic means of decision-making.

Although planning can make no claim as a panacea, it does provide a framework for viewing and coping with change. It makes it possible to improve our control over the nature of the changes that continue to occur and our response to them.

Planning provides a means for determining future, as well as present, needs and the tools and time for developing programs to meet these needs. In order to make good decisions, it is necessary to know the district's strengths and weaknesses, and where they lie. It is also necessary to know how others perceive these strengths and weaknesses. As a community institution, the school serves a variety of publics and interests. It is necessary to know how parents, students, teachers and citizens view their system in order to serve them. In some cases the data and citizen perceptions will agree; in others new weaknesses may be revealed. Sometimes, the district may discover a need to keep the public better informed because, for example, performance levels in a given area are higher than the public (or staff) perception of that performance.

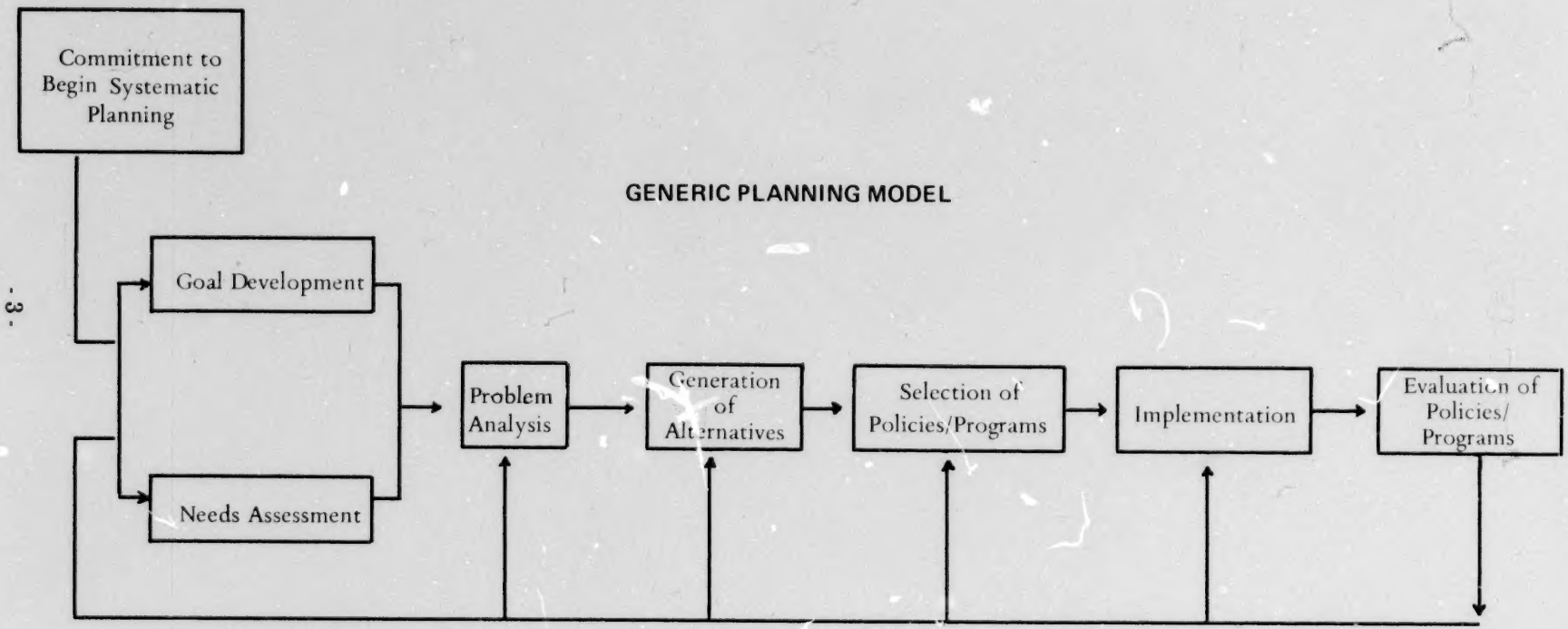
Whatever the outcomes, it is best to cope with the future by beginning in the present. Some means should be employed to involve a cross section of the community in determining goals and objectives, in assessing needs and in assessing the system in relation to the needs and the goals. If no discrepancies exist, the system can safely continue on its course, although the process may identify future changes and needs which should be considered in the present. Where discrepancies do exist, future problems may be avoided by initiating action to resolve the matter. In either case, the system cannot proceed blindly with no regard for the environment in which it functions.

By employing the techniques of needs assessment, the district is also in a better position to allocate increasingly scarce resources at budget time. A knowledge of problem areas and priorities can provide a good place to start in making decisions which can produce the most impact from the funds and other resources available. Such information can be used in making decisions concerning applications for state or local moneys.

C. WHO SHOULD PLAN?

There are no hard and fast rules for the location of the planning function at the district level. District size is, of course, a major factor in determining planning needs. In the largest districts, a planning unit is desirable. Most districts should find one full time planner sufficient to meet planning needs, while, in the smallest districts, the superintendent or an assistant

TABLE 1



GENERIC PLANNING MODEL

Developed by
Bureau of Planning
Divisions of Research, Planning and
Evaluation/Field Services
New Jersey Department of Education
December, 1973

might fulfill this function, employing consultants for assistance and specific technical tasks are required. In the majority of the districts, the use of outside specialists for specific assignments can be an efficient means of employing skills not normally found within the district for short periods of time.

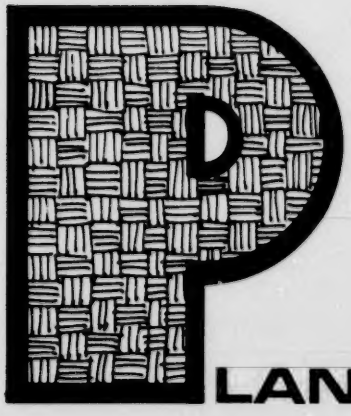
The planning function, to be effective, must be located close to the top decision-makers - the superintendent and the board of education. Planning cannot occur in a vacuum - it is a decision-making tool, and must result in meaningful information which can and will actually be used by the decision-makers.

The planner must prossess a wide variety of skills to perform effectively in that role. These include human relations, community relations, process skills, as well as the mastery of a number of technical tools. The latter include projective and analytic models, management and programming models, the ability to work creatively with goals and objectives and to understand the implications for the district of a variety of data. Various training programs in planning models and techniques are currently available within the state. They range in length, scope and comprehensiveness and are offered through workshops, university based-training programs (degree and non-degree) and privately sponsored training programs.

D. WHEN SHOULD PLANNING BEGIN?

Planning should be an on going process, and it is wrong to assume that its recognition and support can be postponed for a more propitious opportunity. There is a common tendency to put off more formal planning because new funds or programs are anticipated for the following year, or a new board of superintendent may be imminent, or a new state or federal program or policy is in the works. Because good planning should be fluid (i.e., it promotes adaptive response to changes in the environment), it should facilitate transitions of any nature.

Contrary to popular opinion, it does not seem necessary to begin in the planning process at any specific point (such as goal development) and conclude with evaluation. The planning process may begin at virtually any point in the cycle, for it is a cycle and not a straight line with a beginning and an end. A district which has completed or is planning an evaluation of on going programs may begin the process at this point, then develop goals and strategies based upon the outcome of this evaluation. A district which has just completed developing a new budget and programs may begin with an analysis of these proposals to determine the goals implicit in them. This analysis can then become the point of entry into the planning cycle. In other words, all on going activities need not come to a stop because comprehensive planning is about to begin. To be effective, planning must meet individual district needs and constraints.



LANNING PROCESS

A. PRE-PLANNING

A good planning operation should, at any rate, include an early "pre-planning" phase. This is the period in which some basic decisions and policies are made about what is to be planned and how it will be planned and the types of information and resources that are required and available. All too frequently this essential step is minimized or completely disregarded. During this phase, present and planned activities can be examined, and the desired point of entry into the planning process can be determined.

The pre-planning period is also a good time to develop a climate of readiness for the planning activities which will follow. Key individuals and groups can be contacted and kept abreast of developments; meetings can be planned; and public relations groundwork can begin. For example, pre-planning is a good time to create a climate favorable to planning by scheduling film strips or other general presentations. Ideally, a skilled consultant or community relations staff within the district can be of great help in meeting and working with those who will later be involved in the planning process.

B. GOAL DEVELOPMENT

From the outset, planners are presented with a major choice. Which comes first, the goal determination or the needs assessment? Goal determination defines "what should be"– the desired outcomes of the planning process. Needs assessment is the process which provides information on "what is." A comparison of these two phases - what is and what should - be can be analyzed in terms of descrepancies between the two.

Some planning models begin with goal development. In these cases the initial product is a set of education goals for the system or the schools. These goals are usually somewhat broad and are phrased in terms of specific outcomes for students, or systems. An outcome goal statement would state that the school should help every student "to acquire basic skills in obtaining information, solving problems, thinking critically and communicating effectively."

The goals are developed without reference to data concerning what kind of a job the schools are actually doing - participants are asked what they want their schools to do. They are generally statements of optimization or desirable ends. In some models (such as that of Phi Delta Kappa) participants are presented with a standard, pre-developed list of potential education goals, and are asked to rank or prioritize them. In others (Goal Determination in Education) the goals are developed as a result of meetings or group discussions and are "unique" to that system. It has been observed that when the products (goal statements) which have resulted from various district's goal development processes are compared, they usually are quite similar. That is, most education goals tend to be variations on a list of about 20 major goal statements, from which individual districts will tend to select 5-10 as their major concerns. Districts also tend to assign different priorities to similar goals, an important factor for administrators to take into consideration. Nevertheless, the involvement of

the community in this process and reassessment of previously informal guidelines are most significant.

The key to a successful, meaningful goal determination project is broad-based participation. It should include parents, all segments of the community, teachers, administrators and students. There is no set rule as to the correct number of percentage of participants, although in both cases, the higher the better. Most critical is the genuine opportunity for all to participate on a meaningful level. It is necessary to realize that tapping the opinions only of "leaders" is not sufficient.

Although different models propose a variety of methods for eliciting goals for the system, it is possible to make some generalizations. Basically, goal elicitation is a development of the technique known as "scaling," a well developed and generally reliable social science tool for the measurement of attitudes. Some models ask participants to rank and compare potential goals. Complex models may employ various types of meetings to assist in formulation. Such meetings can be open sessions, or highly structured forums. A representative system may also be employed, in which a large segment of the community elects individuals to represent them at smaller delegate sessions. It is also possible to obtain or verify goals by means of polling a selected sample of the district population.

It is essential to keep in mind the need to involve as many citizens as possible. To do this, the process should not make burdensome demands on people's time. It is unrealistic to expect most parents and citizens to attend a long series of regular sessions which may last for hours into the night. The relatively small percentage of individuals who will commit themselves to such projects are not often representative of an entire district. The goal elicitation model and its purpose must also be comprehensible to all segments of the community, not just the well-educated. If there is a significant non-English speaking population in the district, translations must be provided. The result of the goals phase of the planning program should be a set of goal statements upon which some community consensus has been reached. They should be meaningful to the district decision-makers, and comprehensible to the public. They may, or may not, be prioritized. For maximum value, decision-makers should also have an understanding of areas of agreement and disagreement within the district. It is important to know where differences lie and which groups, if any, have different goals and expectations. You must know what people want before you can plan with them.

C. NEEDS ASSESSMENT

Needs assessment involves reality testing. At some point, either at the beginning, or after the general goals have been determined, the district must ask itself, "Where are we now?" It is one thing to know that there is agreement upon the need for producing excellence in basic skills, and another to know how well the goal is already being met and how far the system still has to go to satisfy the need. A needs assessment, then, requires both the determination (not necessarily via testing) of present conditions and the specification of

the discrepancy between the status quo and the goal.

There can be two aspects to the evaluative phase of needs assessment. The first requires a process in which district needs are assessed in terms of perceived performance. The second requires that these perceptions be tested against reality - the performance is measured. Again, as in goal elicitation, a broad base of participation is important. Participants are usually asked to rate the district (or school) according to their own perceptions. Again, scaling techniques are used to provide useful information. When such ratings are used, the most important information can come from a comparison of differences in the perceptions of the various groups who have been involved, i.e. teachers, students, parents, employers.

It is not enough, however, to assume (as some models do) that because people perceive a problem (or strength) that their perceptions actually are correct. In some instance they will not be (and in cases of disagreement, data can resolve the situation). For example, the assessment survey may reveal that the public considers the health education program to be weak. Testing and assessment may indicate the program is strong. There is still a problem, but the solution would lie in improving communications with the public about the effectiveness of the program, not in changing the health program.

It is up to the individual district to choose the assessment instruments which will best meet individual needs, although this process may well require expert consultation. It is poor practice to limit assessment to achievement testing in basic skill areas. Information may be gathered in many other areas in many ways. Data on student and community characteristics from census and other sources are important. Observational data from classroom situations may be employed. Various measures and tests for affective aspects of the educational process are also available. The results of communications and organizational analyses can also provide good data upon which to make decisions.

Obviously, there are an almost infinite number of potential assessment targets within any school system, and a limited amount of resources to conduct assessments. In models in which goal elicitation takes place before assessment, the goals can provide an indication of priority areas of assessment - i.e. the next step is to assess conditions relative to the district's goal statements.

On the other hand, if assessment is the initial step, some judgement decisions will have to be made by the district administrators and board. One approach to the question of "What to assess?" is to gather some initial data through a "concerns" meeting, or an opinionnaire or survey approach to determine some perceived problems within the system. These can then be given top priority for assessment techniques. It is also possible to rely upon the professional judgment of administration and staff to zero in on areas for analysis, although without employing a formal technique to elicit areas of concern, this approach is less reliable.

If the district goals are determined after needs assessment data are available, the results may well be different from what they would have been if the order were reversed. Even

with widespread citizen participation, a foreknowledge of technically determined problem areas is likely to influence perceptions of what district goals should be. The goal statements will most probably be more specific and problem/program oriented, rather than global and philosophical. Ideally, of course, there is an interaction and revision of goals and objectives as data are continually fed into the planning system and digested.

Although there are many potentially effective models for eliciting goals and needs assessment, the key remains a real committment on the part of the district to make the selected process work. Rarely will the citizens storm the gates for the opportunity to participate. The only way to involve a real cross section of the community, especially those who are not inclined to take part in civic affairs, is to work at it. It is not enough to merely provide an opportunity for participation, it is essential to produce involvement.

The final product of the needs assessment phase should be a clearly specified statement of the discrepancy between "what is" and "what should be," the distance which must be covered to reach each goal. This gap, or need, is always related to the goals, not to the difficulty anticipated in reaching the goals. By combining both perceived importance of the goal achievement, and the gap between present efforts and desired outcomes, it is possible to place a priority ranking upon the goals and to move on to the next phase of the planning process.

For example, district goals which might be ranked could include (1) Learn how to be a good citizen; (2) Develop basic skills (reading, writing, speaking, listening); (3) Develop a feeling of self-worth; and (4) Gain information needed to make job selections. The goals which would receive the most attention would be those which have the highest ranking in importance coupled with a low rating on performance. If the community and staff do not consider a given goal to be of high importance, or if no gap or need exists between what the system is doing and what the system should be doing, resources should be directed toward higher priority goal areas.

D. PROBLEM ANALYSIS

Once again, there is no single, guaranteed model for approaching this phase. Obviously, the approach toward problem analysis will in large part be dictated by the outcome of the previous stages. The usual approach is to examine the reasons for the discrepancy between the goals and the needs and the various interrelationships among them.

Problem analysis should begin with a problem statement which answers these questions: Who is affected? Who is causing it? What kind of problem is it? What is the goal for improvement?

An example of a problem statement at the district level might be: Four hundred Spanish speaking students are reading more than two years below grade level because they have difficulties comprehending and speaking English and our teachers are not trained in teaching students with this problem. We would like to see the number of students in this category reduced from 400 to 50 within a year.

In one way or another, most methods of problem analysis seem to employ a variant of the "force field" technique. In pure form, this approach begins with each goal and examines the barriers and constraints to achieving the goal. In addition, positive factors for reaching the goal are also considered in an opposite column. It is then possible to attempt to rate both positive and negative forces in terms of both potential impact, and difficulty of achievement. The problem analysis phase may be carried out by one or several staff members, superintendent, planners, middle-level administrators, consultants or committees, and task forces. Again, the extent of the problems and the available resources will dictate the allocation of manpower for problem analysis. Data delineation, constraints, influences, resources and related factors are critical to this phase. Sometimes such data gathering must go beyond the district to the region, state or nation. Often, this phase will result in the production of specific objectives and subgoals.

If done properly, the problem solving phase will provide a natural lead-in to the following phase - the generation of alternatives.

E. GENERATION OF ALTERNATIVES

A problem analysis can indicate which directions can best be pursued. Goals and programs for solutions which are most resistant to change or too expensive to change may be quickly eliminated. Alternative solutions are suggested by the "weak" points in the field analysis. The best strategies have the strongest positive forces aligned against the weakest negative ones.

Alternative solutions are generated in various ways. A useful starting point is the process of "brainstorming." This is a technique in which alternative solutions are presented as rapidly as possible in a group setting, then discussed, analyzed and refined. Specialists, consultants, various staff members and task forces may also be used in developing alternatives solutions to district problems. Research sources such as ERIC should be investigated. Alternative methods are analyzed in terms of effectiveness (quality), cost and time required (resources), consequences on other goals, impact (quantity), political feasibility and other side effects, both positive and negative.

Although brainstorming may be the initial step in developing alternatives, it should be clear that a large number of technical tools should be applied during this phase. These include program budgeting, PERT, cost-benefit analysis, projective techniques and research and literature reviews. The outcome of this stage should be a group of alternative solutions of courses of action, their cost, and their estimated impact.

For example, student absenteeism may be the problem that a district has identified. Alternative solutions which might be explored could include: increased penalities for non-attendance; increased incentive or rewards for attendance; changes in curriculum offerings; changes in student attitudes, and changes in teacher attitudes. Each of these would then be examined in more detail with tentative courses of action developed for those not immediately eliminated.

F. SELECTION OF ALTERNATIVES

At this point, actual policy and/or program alternatives are selected for implementation. The choice is ultimately made by the decision-makers - the board of education and the superintendent. However, they may choose to delegate this function to staff or even to the same group involved in the previous stages of the planning process or to ask them for recommendations. Although the responsibility for decisions rests at the highest levels, we do know that a program, especially one involving change, has the best change of success if those directly affected play a major role in its planning.

Here again, there is a great deal of latitude in the method which can be used in selecting among alternatives. Although rational techniques are available as aids, many decision-makers will no doubt still prefer to "fly by the seat of their pants." A more logical approach is to employ some variation of a ranking approach.

For example, the model developed in Fresno, California, provides for the assignment of an arbitrary score (ranging from plus 4 postivie effect to minus 4 negative effect) to each of the proposed solutions. A separate ranking is assigned for each of a variety of factors: staff reaction, community reaction, student reaction, costs, availability of resources, time needed to implement and success of similar ventures. It is then possible to derive a cumulative score for each alternative, and rank them. The factors to be rated may vary to suit the decision-makers, and more sophisticated variations can provide for a system of weighting factors. Tabie II contains an example of the Fresno decision-making for the problem of reducing dropout rates.

G. IMPLEMENTATION

Without effective implementation, the entire planning process can be reduced to a meaningless exercise. The next task is to implement the chosen solution to insure its success. Most people, when they think of planning, think of the implementation phase. The solution is picked (often pre-determined) and its implementation is sought. The role of the planner is seen as developing the plan for that implementation. This type of planning is often referred to as program planning. As a rule, this phase provides a new complication, in that the planners are not responsible for the implementation. This is in the hands of administrators, staff, and actual participants. This is one reason why those affected should not be brought into the plan at the last minute. In addition, by involving the potential implementors, the planner will also have a better chance of developing a plan which has a good foundation in reality.

Planners cannot guarantee success in implementation, but the plan can attempt to optimize the chances for success by means of a carefully planned and delineated implementation schedule. The Fresno model provides a good summary of the steps which should be included in any implementation plan:

1. Reassess the problem and solution.

2. Outline the major activities.

3. Consider all the groups and agencies which will be affected by the program.

4. Identify remaining constraints.

5. Identify all the activities and sub-activities and the persons who will be responsible for carrying out each of these.

6. Plot the calendar assignments and activities. Include target dates. A PERT diagram or other easily understandable chart is helpful and clarifies areas of responsibility.

In addition, a good implementation plan provides for ongoing monitoring during this phase. The feedback can then be used to keep the plan "on course."

H. EVALUATION

In this planning process context, we shall define evaluation as the process of determining how well the goals and objectives of the programs planned have been, or are being, attained. Most educators are familiar with summative evaluation, in which the conditions which exist at the close of the project period are assessed. Summative evaluation asks the retrospective question, "How well did it work?"

However, the planning process must also rely upon formative evaluation, which provides for periodic checks which ask, "How well is it working?" In other words, formative evaluation looks for and points out signposts and danger signals along the way, throughout the life of the project.

Although the planner does not usually conduct the actual evaluation, the information provided through the formative process can be the foundation for the necessary ongoing revisions of the plan (feedback) which can become the difference between success and failure. Any plan which cannot adjust to unforseen circumstances and conditions is a straight-jacket and can even be more harmful than no plan at all.

It is therefore essential that evaluation consideration be built in from the outset of the planning process, as evaluation techniques and data play an important part in the initial needs assessment and in assessing and monitoring the implemented plan. Ideally, the district will have an evaluation specialist on hand to assist in the development of the entire planning program. In some cases, a specialist can be called in as a consultant at strategic points throughout the process. In any case, both formative and summative evaluation must take place, and should meet the needs of the planners and decision-makers.

The tools of evaluation are numerous. They include standardized instruments)achievement and aptitude tests, attitude scales, performance tests); non-standardized instruments

Table II: Alternative Selection Matrix

Problem: To reduce the dropout rate by 25% per year.

Proposed Solutions / CONSIDERATIONS	Staff Reaction	Community Reaction	Students Reaction	Costs	Availability - Resources	Time to Implement	Success - Similar	TOTALS	RANK
Regional Vocational Education	+3	+3	+3	-2	+2	-1	+3	+11	1
Reduce Class Size	+3	+1	+2	-4	0	0	+1	+3	4
More Counselors	+3	+1	+1	-4	0	0	+1	+2	5
Quarters, Half-day Classes	+2	+1	+2	0	0	-1	+1	+5	3
Learning Teams	+2	+1	+3	-2	0	0	+1	+5	3
Select Own Advisor	+2	+2	+3	0	+2	0	+1	+10	2

In the above case the task force elects to propose a regional vocational center and a system in which students may select their own advisors from among all certificated members of the staff. It will also give serious consideration to the establishment of learning teams and realignment of the school calendar to establish a quarter system with half-day classes.

Source: From Goals to Action (Fresno Model) p. 29

(criterion referenced tests, rating scales, reports, surveys, recordings and video tapes, logs and records); and personalized techniques (interviews, observations).

In most cases, the planner is not the evaluator. The planner does not usually carry out the acutal evaluation. The plan does provide for the evaluation component and the planner and decision-maker(s) should begin working with the evaluator from the outset. In this way, it is possible to obtain data which can, and will, actually be used in making decisions. Although planning is not evaluation and evaluation is not planning, the two share an interrelationship of dependency; neither can be fully effective without the other.

I. RECYCLING

Planning, to be effective, must be conducted as a continuing, on-going process. Although it is not reasonable to expect that any district can conduct each phase of the planning process every year or two, it is necessary to recognize the need to recycle the entire process at periodic intervals. For example, goals must be re-assessed every five years, implementation must be monitored continuously and evaluation activities must be conducted regularly. These, in turn, can result in regular review of the plans and programs and corrective measures if called for. Without such a cyclical view of planning, it is unlikely that long-term, satisfactory results will be obtained.

J. CONCLUSION

This has been a necessarily brief overview of the process of comprehensive planning for local districts. It is intended as an introduction to the concept of local district planning as it may currently be practiced. There is, as yet, no dogma, or single "right" way to practice education planning. Each of the delineated phases of the comprehensive process are examined in greater detail in the subsequent volumes in the Planning Handbooks for Local Districts series.

LOSSARY

GLOSSARY

The following terms, and their definitions, have been compiled, modified and adopted from a variety of sources. Bernarr Furse's Glossary of Educational Planning Terms" (in Comprehensive Planning in State Education Agencies, Utah State Board of Education, Salt Lake City, Utah, 1968) was especially valuable as a basis for the present compilation.

Assessment - The act of gathering data, pooling information and making comparisons.

Audit - See Education Program Audit.

Behavioral Objectives - A precise statement which answers the questions: Who will do what, when, and how well?

Benefit-Cost Ratio - An economic indicator of efficiency, computed by dividing benefits by costs.

Brainstorming - A form of group dynamics designed to encourage creative and imaginative thinking in problem solving through an uninhibited exchange of ideas.

Budgeting - The process of translating planning and programming decisions into specific projected financial plans for relatively short periods of time. A precise statement of the distribution of fiscal resources.

Community - All those individuals within the geographic boundaries of a particular school attendance area of school district who will be affected by the educational process taking place.

Comprehensive Planning - A complete planning process, which includes the following components: pre-planning; goal development; needs assessment; problem analysis; generation of a alternative solutions; selection of alternatives; implementation; and evaluation.

Planning which involves: (1) Consideration of all relevant factors; (2) Participation of all agencies and persons who should contribute to the development of a given plan; an extended time limit middle and long range planning.

Concern - The unrefined, unevaluated expressions that emanate from individuals or organizations in their attempts to identify needs or problems.

Concerns Analysis - The process of identifying all relevant facts, values, and policies related to a given concern; a technique used in problem identification.

Constraint - Obstacles or barriers (real world boundaries) that already exist which may jeopardize or deter, in whole or in part, the successful accomplishment of the mission or its specified performance requirements.

Context Evaluation - Evaluation with the purpose of providing a rationale for determination of objectives for the system. It defines the environment, identifies unmet needs and unused opportunities and diagnosis constraints perventing their attainment. (Phi Delta Kappa, National Study Commission on Evaluation)

Cost-Benefit Analysis - An analytical approach to decision-making and problem solving involving the definition of objective and identification of the alternative that yields the greatest benefits for any given cost, or a required or chosen amount of benefits for the least cost. The analysis usually involves quantification (in dollars) of the alternative outputs.

Cost Curve - A graphical representation of the relationship of cost to another variable, such as output. It is conventional to construct these curves with costs along the verticle axis and the related variable along the horizontal axis.

Cost-Effectiveness Analysis - An analytical approach to decision-making and problem solving requiring definition of objectives, generation of alternatives, and identification of the alternative that yeilds the greatest effectiveness for any given cost, or a chosen degree of effectiveness for the least cost. The term is usually used in situations in which the alternative outputs cannot easily be quantified in dollars.

Criteria - Premises on which priorities are established among alternatives in order to measure relative degree of desirability.

Critical Path - In P.E.R.T., and other network-based management systems, that sequence of events and activities that has the greatest negative, or least positive slack, or the longest path through the network.

Decision Matrices - A method of allocating resources, determining priorities, or selecting goals by graphically displaying the relationships of mutliple interdependent variables in two or three dimensions. For example, one dimension of a decision matrix in education might be available funds while the other dimension might be faculty salaries, maintenance costs, library costs, etc.

Decision Variable - A variable over which one can exert some control, whose value one can choose as a result of a decision. The decision variable might be the amount of food one must eat to satisfy hunger.

Delphi Technique - A procedure for systematically soliciting and collating the opinions of experts on the future of a preselected subject through individual interrogations, usually by questionnaires. An attempt is made to achieve consensus of convergency of opinion by the feedback of results to the participants and recycling the process.

Deterministic Models - A mathematical abstraction of real world phenomena; a set of relationships among quantitative elements - paramaters, variable inputs and variable outputs.

Diffusion - The processes by which an innovation is adopted and placed in operation.

Discrepancy Analysis - The process of determining and analyzing the need, gap between "what is" and "what should be."

Dissemination - The distribution of information, ostensibly about a program, project, or activity worthy of emulation.

Educational Planner - A person skilled in the application of planning technology to the solution of educational problems, and whose job assignment is concerned wholly or in large part with educational planning.

Education Program Audit - An audit, or check, on the evaluation process, rather than an assessment of the program or project being evaluated. An audit can determine the appropriateness of the evaluation techniques used and evaluate the manner in which it was, or is being, conducted.

Effectiveness - The performance or output received from an approach or program. Ideally, it is a quantitative measure which can be used to evaluate the level of performance in relation to some standard, set of criteria, or end objective.

Evaluation - Activities undertaken in an attempt to determine the value and/or success of a program, project, technique, etc.; the act of making judgments based upon the data gathered.

Feedback - In planning, feedback is the evaluative information which describes the functioning of a system and, when there are malfunctions, is used as the basis for revision or modification of the system.

Flow Chart - A pictoral description of a plan showing the interrelationships of all required events.

Force Field Analysis - A decision-making, problem solving technique in which values are placed upon positive and negative forces affecting goal attainment.

Formative Evaluation - The process by which evaluation data concerning on-going implementation is provided to decision-makers. It provides periodic checks to answer the question, "How well is it working?"

Functional Analysis - The process used to determine what functions or jobs must be done to accomplish the mission objectives.

Functions - In the context of the system approach, those things (actions) which must be done to accomplish the overall job.

Futures/Futuring - The use of techniques for the purpose of systematically exploring and comprehending future possibilities.

Gaming - A means of providing a simulated operational present or future environment to make possible multiple interactions among competing or cooperating players (not to be confused with game theory).

Generic - Relating to or characteristic of a whole group or class: general (Webster). Generic problem-solving model is one which ostensible may be applied to the process of seeking a solution for all problems of the kind for which the model is designed.

Goal - A statement of broad direction, general purpose or intent. A goal is general and timeless and is not concerned with a particular achievement within a specified time.

Goal Indicator - An occurance or state of being that would be in effect should a goal be met. A fact or factor that will illustrate or amplify the goal statement.

Incremental Change (Incrementalism) - Change on a piecemeal basis, in which each step represents a slight shift from the status quo. Often referred to as "muddling through", it represents an alternative to thorough comprehensive planned change.

Implement - To carry out: Fulfill, especially to provide a definate procedure to ensure fulfillment of a plan.

Indicator - A factor which is used to estimate the degree of goal attainment.

Innovation - Educational innovation is a new or different concept, methodology, organization or program that is systematically introduced into the classroom, school system and/or the state.

Input-Output Tables - Models of an economy which is disaggregated into sectors and in which explicit account is taken of sales and purchases between sectors. One set of parameters which is common to all such models are technical co-efficients; the technical co-efficients of an industry are the number of units of input or each industry which are required in order to produce one unit of output of the given industry.

Interface - In the system approach, the term applies to the specific relationship and/or interaction between elements or components of the system.

Interim Performance Objective - A behavioral objective that constitutes one step or phase in the achievement of a given terminal performance objective.

Iterative Process - A process for calculating a desired result by means of a repeated cycle of operations, which comes closer and closer to the desired results.

Long-Range Planning - Planning which looks beyond the immediate problems of the next 5 years. The specific length of time considered is arbitrary.

Management By Objectives (MBO) - A managerial technique which seeks to improve managerial performance through clarifying individual responsibilities and authority, and relating them to results that must be achieved.

Management Model - A design for implementing the operations model. It includes: (1) administration requirements; allocation of responsibility for function; (2) tasks, flow of operations (PERT); (3) costs, budgets and evaluation.

Methods-Means Analysis - The identification of all possible methods (strategies) and means (vehicles) for implementing each strategy, and the listing of the advantages and disadvantages of each for achieving one or more of the specified performance requirements identified in a system analysis.

Middle-Range Planning - Planning which covers a span of about 2-5 years into the future.

Mission - The job to be done, be it a product, a completed service, or a change in the condition of somebody.

Mission Analysis - The first major function involved in the analysis of a problem. Mission analysis includes: (1) defining the overall mission objective, (2) determining the mission performance requirements, (3) determining mission constraints, and (4) determining the mission profile.

Mission Objective - A precise statement expressed in operational terms which identifies the overall intent of a mission.

Mission Profile - The major functions which must be performed to accomplish a mission. These functions are arranged in logical sequence and depicted in flow-chart form.

Model - A generic description which may be applied to a related set of processes or situations. A schematic representation of the relationships that define a situation under study.

Monitor - To collect and analyze feedback during the implementation (on-going) phase of a program or project.

Need - The difference between "what is" and "what should be." All institutional needs must be related to learner needs. Needs should be related to a problem rather than a solution.

Needs Assessment - A systematic approach to identifying the discrepancy between "what is" and "what should be."

Network - A flow diagram consisting of the activities and events which must be accomplished to reach the program objectives, showing their planned sequences of accomplishment, interdependencies, and interrelationships.

Objectives - Desired accomplishment which can be measured within a given time and which if achieved, will advance the system toward a goal. Quantifiable desired outputs within a time and space framework. By achieving the objectives, progress toward the goal is advanced, for example measurable learner behaviors. Goals, or results that the decision-maker wants, or should want, to attain.

Operational Philosophy - An accumulation of identified values that are used as a kind of "guidance mechanism" in the problem-solving approach. It is an organized arrangement of all of the values generated through the concerns analysis procedures.

Operational Simulation - The manipulation of a mathematical or mechanical representation of a system or process, so that, by plugging in real or potential changes in the system enviornment, it is possible to observe the operation of the system in a variety of conditions.

Operations Model - A design for producing the system products. It includes procedures, tasks, jobs, designs, equipment, method-means, and performance criteria.

Operations Research (O.R.) - The use of analytic methods adopted from mathematics and other disciplines for solving operational problems. Among the common techniques used in O.R. are: linear programming, probability theory, information theory, Monte Carlo methods and queuing techniques.

Parameter - A value which is, held constant during some calculation. The parameters of a system or model are characteristics, some of which may be assigned selected values while examining the effects of variation in other characteristics of the system.

Participatory Planning - The involvement in the planning process of all groups and individuals (or representatives) affected by the educational policy.

Performance Budget - A budget based upon functions, activities and projects whose principal analytical orientation is the measurement of effeciency of operating units. For example, such a budget in an agency might require computation of the cost per unit of mail processed for one branch of the agency and the cost per loan application processed in another branch.

Performance Objective - A clear precise statement of what the learner is to do to demonstrate competency at the end of a prescribed learning period. It describes how the learner is to demonstrate his/her competency and how well the learner is to perform in order to demonstrate that competency.

Performance Requirement - A series of criteria or standards by which the success or failure of the system or mission is to be ascertained. Normally, these are comprised of products, specifications, performance characteristics and restrictions; and they allow measurements to determine how well the system is performing with respect to the goal.

P.E.R.T. - P.E.R.T. (Program Evaluation and Review Technique) is a set of principles, methods and techniques for effective planning of objective-oriented work establishing a sound basis for effective scheduling, costing controlling and replanning in the management of programs. It employs a product-oriented work breakdown structure, a network flow plan, elapsed time estimates and identifications of critical paths in the networks, a schedule, and analysis of the interrelated networks and other components.

Planned Change - A systematic and logical approach to planning for the future. There are two major aspects to planned change: (1) prediction, the accurate sensing of changing needs as reflected in societal goals, and the determination of necessary modifications in performance that will successfully accomplish these redefined goals, and (2) design, translating the predicted changes into specific individual behaviors relevant to successful completion of the goals.

Planning Capability - The organizational, procedural, technological, and support arrangements by which an agency has the capacity to apply problem-solving processes to any problem which it may face.

Policy Planning - Planning for broad system goals and directions.

P.P.B.S. - Programming-Planning-Budgeting-System systematizes the (1) appraisal and comparison of various government activities in terms of their contributions to objectives, (2) determines how a given objective can be attained with a minimum expenditure of resources, (3) projects government activities over an adequate time horizon, (4) compares the relative contributions of private and public activities to stated objectives, and (5) allows for continuous revision of objectives, programs and budgets in the light of experience and changes in circumstances.

Pre-Planning - Preliminary steps laying the groundwork for a comprehensive planning process. Includes obtaining a commitment from decision-makers, creating a climate of receptivity and awareness of the activities which will take place within the community, and "planning to plan."

Problem - A problem exists when there is a goal to be attained with no well-defined or well established way of attaining it or when the goal is so vaguely defined or unclear that relevant means for attaining it cannot be clearly determined. A problem is the requirement for a strategy or means to reduce or eliminate a need.

Problem Identification - A part of the needs assessment procedure which identifies relevant facts, values, and policies related to an expressed concern and then validates the concern as a problem in terms of accuracy, validity, feasibility, and criticality.

Program - A major agency endeavor, mission oriented, which fulfills statutory or executive requirements, and which is defined in terms of the principal actions required to achieve a significant end objective.

Program Budget - See Performance Budget.

Program Category - A classification within a program structure which expresses the purpose of the program.

Program Element - A subdivision of a program category which comprises the specific products that contribute to an agency's objective(s).

Scaling - Any one of a variety of techniques developed for the purpose of quantifying and comparing subjective values and attitudes.

Scenario - The imaginative construction into the future of a logical sequence of events based upon current conditions.

Self-Study - The phase of a needs assessment in which the system gathers data to assess actual conditions (reality) relating to goals. These results may then be compared to the community and staff perceptions of system performance.

Sensitivity Analysis - A procedure by which different judgements are made about the value of a parameter and then an analysis is run with each of the different values to see what different effects result. The technique may be employed when the data base is non-existent or of such poor quality that other analytical methods cannot be employed reliably.

Short-Range Planning - Planning for immediate needs, usually for a time period not exceeding two years.

Simulation - An abstraction or simplification of a real world situation.

Social Accounting - An effort to conjecture about the future of a nation, social system or institution by determining the "sum" of a series of independent factors.

Strategy - A careful plan or method.

Sub-Goals - Objectives, or partial goals, the attainment of which are necessary components in reaching the larger goal.

Sub-System - Any given part of a total system which could in its own context be considered a system of its own.

Summative Evaluation - The evaluation of the product of a program or project. It answers the question, "How well did it work?"

System - The sum total of parts working independently and in interaction to achieve a common purpose.

System Analysis - The process of determining the parts of a system and the way in which they relate one to the other and with the total system. It is used during the problem solving process for identifying problems and analyzing a problem and setting goals.

System Approach - A technological method of problem solving, systematically utilizing formalized principles and analysis and synthesis. A system approach to education would attempt to consider every element in any environment related to a definitive problem.

System Synthesis -The process of determining the most relevant and most practical way to achieve a mission objective.

Target Group - A group within the general population toward which a program is aimed or on which it has a significant impact.

Tasks - Elements of a function which, when performed by people and things in proper sequential order, will or should resolve the parent function.

Task Analysis - The process of identifying the units of performance to be accomplished in order that the function from which they are derived may be accomplished.

Terminal Performance Objective - A behavioral objective applicable to the end product. In one context, terminal performance objectives may apply to the student product as he completes grade twelve; in another, they may apply to the student at the end of a course; and so on.

Time Line - A graphic depiction of the occurance of activities, past and/or future, in temporal sequence.

Variable - A characteristic which can take on different values.

BIBLIOGRAPHY

"ED" numbers refer to the number of the microfiche of the document in the E.R.I.C. system. Microfiche can be requested from the New Jersey Occupational Research Center in Edison, New Jersey. (201-985-7769).

GENERAL BIBLIOGRAPHIES

Administering for change. An annotated bibliography. Research for Better Schools, Inc., 1700 Market Street, Suite 1700, Philadelphia, Pennsylvania 19103.

Models for Planning. September, 1970. 17 p. ED 043 114.

John S. Hall, Models for Rationale Decision-Making. September, 1970. 19 p. ED 043 115.

PLANNING IN GENERAL

Bolan, Richard S., et. al. "A Social-Action Approach for Planning Education," paper AIP, October 1970, ED 047 376.

Ewing, David. The Human Side of Planning. Mc Millan, New York, 1969.

Ewing, David. The Practice of Planning. Harper and Row, New York, 1968.

Green, Thomas, Ed., Educational Planning in Perspective. Futures, IPC Science and Technology Press, England, 1971.

Haveloch, R.G., The Change Agents Guide to Innovation in Education. Englewood Cliffs, New York, Ed. Technology, 1972.

Haveloch, R.G., A Guide to Innovation in Education. Institute for Social Research (University of Michigan. Ann Arbor, Michigan.

Kaufman, Roger, Educational System Planning. Prentice-Hall, Englewood Cliffs, N.J., 1972.

Miklos, E. and others, Perspectives on Educational Planning. 1972, ED 066 787.

Phi Delta Kappa National Study Commission on Education (Stufflebeam, Foley, Gephart, Ginba, Hammond, Maryiman & Provus), Educational Evaluation & Decision-Making. F.E. Peacock, Itasca, Illinois, 1971.

Techt, Leonard and Huefner, Robert, "Strategic Variables in Planning." Designing Education for the Future, No. 3, Planning and Effecting Changes in Education. Morphert, Edgar and Ryan, Charles, Citation Press. 1967, p. 1-12.

Tanner, C. Kenneth. Designs for Education Planning. A Systematic Approach. Lexington, Mass. Heath Lexington Books (D.C. Heath and Co.), 1971.

Tenhin, Sandord, "Comprehensive Planning for School Districts," Paper, AERA, 1970. 12 p. ED 041 389.

MODELS

Center for the Study of Evaluation. Elementary School Evaluation Kit. Obtainable at $80.00 from: Allyn and Bacon, Inc., Langwood Division, Boston, Mass. 02210.

Evaluation Workshop II: Needs Assessment/Preliminary Version. CTB/McGraw-Hill, Del Monte Research Park, Monterey, California 93940. Telephone 408/373-2932.

School and Community: Partners in Education. School District Goals. Fresno County Department of Education, 2314 Mariposa Street, Fresno, California, 93721, Cost $12.00 for materials on Fresno planning model.

School and Community: Partners in Education. School/District Profile . Fresno County Department of Education, 2314 Mariposa Street, Fresno, California, 93721, Cost $12.00 for materials on Fresno planning model.

Inter active Education, Inc., In-Service Education, 123 Sylvan Ave., Englewood Cliffs, New Jersey 07623. Anne Wennhold, Director; 201/947-0458.

Workshop Packet for Educational Goals and Objectives. Phi Delta Kappa, Inc., Eight and Union, Box 789, Bloomington, Indiana 47401. Kit $28.00.

Sharing Decisions-Dallas Style: An Overview of Dallas Model for Shared-Decision-Making. Dallas Independent School District, Communications and Community Relations Department, 3700 Ross Avenue, Dallas, Texas 75204, 1973.

Project Next Step Training Materials. Worldwide Education and Research Institute, 2315 Stringham Avenue, Salt Lake City, Utah 84109, 8-1/521-9393.

EVALUATION OF COMPREHENSIVE PLANNING HANDBOOK

1. Please rate the following sections of the handbook according to the scale below:

   1 - very good
   2 - OK
   3 - poor

	Clearness	Usefulness
Section 1-overview of comprehensive planning	_____	_____
Section 2		
a. Pre-Planning	_____	_____
b. Goal Development	_____	_____
c. Needs Assessment	_____	_____
d. Problem Analysis	_____	_____
e. Generation of Alternatives	_____	_____
f. Selection of Alternatives	_____	_____
g. Implementation	_____	_____
h. Evaluation	_____	_____
i. Recycling	_____	_____
Section 3-Glossary	_____	_____

2. In what ways has this handbook been helpful to you?

_____ As an overall orientation to comprehensive planning

_____ To provide others with an introduction to comprehensive planning

_____ As a resource for obtaining further information about planning

_____ As a reference for planning terms and concepts

_____ Other (Please explain)_____

_____

3. What improvements might be made in a revised version of this Handbook?

Responding Agency (if desired)_____

When evaluation is completed, fold sheet in half. Staple closed and mail.